

DETAILED ACTION

1. This communication is in response to RCE filed February 27, 2008. Claims 1-9, 15-26 and 30-38 are pending. Claims 10-14 and 27-29 have been cancelled. Claims 1, 15, 20, 30, 31, and 32 are amended. Claims 34-38 are newly added.

Response to Arguments

2. Applicant's arguments filed with respect to claims have been fully considered but they are not persuasive.

3. Referring to claim 20, Applicant argues that Squires fails to disclose the claim as amended, namely, that the transformed user request comprises additional information not present in the user request to automatically organize workflow. However, Examiner respectfully disagrees. Squires discloses that the job decomposition module 64 determines the manner in which to process the document processing job 62 (user request) and determines whether decomposition is appropriate based on the overall capacity of cell arrangements in the network. Examiner submits that based on at least this information (which is not present in the initial document processing job 62 request), the document processing job 62 is split into sub jobs 66, 68 and 70 (see Fig. 8; col. 5, lines 35-41). The workflow is then organized for the cells and devices based at least on this cell capacity information and the sub jobs 66, 68 and 70 (col. 5, lines 16-28). As such, Examiner maintains that Squires teaches that the transformed user request comprises additional information not present in the user request to automatically organize workflow.

The rejections of claims 1, 15, 30, and 31 are also maintained for the same reasons as claim 20 above.

Referring to claims 4-9, 17-19, 22-26, 32 and 33, in response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

4. Applicant's arguments with respect to claim 32 have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claim 32 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Referring to claim 32, the claim recites the limitations "wherein each of a plurality of stylesheets.." and "at least two of the plurality of stylesheets..". However, it is unclear

as to whether the plurality of stylesheets in the limitations is meant to refer to the 'at least one stylesheet' of claim 9 from which claim 32 depends.

Due to the 35 USC 112 rejections, the claims have been examined as best understood by the examiner.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

6. Claims 1-3, 15, 16, 20, 21, 30, and 31 are rejected under 35 U.S.C. 102(e) as being anticipated by US Patent 7,065,567 issued to Squires et al (hereafter Squires).

Referring to claim 1, Squires discloses a workflow management device ('printing workflow system', Abstract; Fig. 1, element 2; Fig. 2, element 2; Fig. 3, element 20) comprising:

- a communications interface configured to receive a user request (input module receives document processing (print) jobs, Fig. 3, element 24; col. 3, lines 58-64) comprising one or more user-desired product properties associated with a user-

desired product (print job characteristics, col. 4, line 60 –col. 5, line 10; see also Fig. 7, elements 46, 48 and 50), the interface further configured to communicate with one or more workflow processing devices located external of the workflow management device (see devices 5 and 7, Fig. 1; Fig. 8, elements 77-79);

- a storage device configured to store predefined rules data for processing the user request ('Storage' contains programming instructions to manage document processing jobs, Fig. 3, element 23; col. 3, line 58 – col. 4, line 2; 'Storage' also stores 'capacities' and 'capabilities' predefined rules, col. 4, lines 14-27); and
- processing circuitry ('Processor', Fig. 3, element 22) configured to process the user request using the predefined rules data to produce a transformed user request without communicating with the one or more workflow processing devices ('job decomposition module' processes print jobs into sub-jobs based on capacity and capability predefined rules, col. 4, lines 11-36; col. 5, lines 29-54; Fig. 8, element 64), the transformed user request including additional information not present in the user request for automatically organizing workflow among the one or more workflow processing devices in accordance with the one or more user-desired product properties to achieve the user-desired product via the one or more workflow processing devices (col. 5, lines 16-28 and 35-48; Fig. 8).

Referring to claim 15, the limitations of the claim are similar to those of claim 1 above in the form of a system (Squire, Abstract). As such, claim 15 is also rejected for the same reasons as claim 1. Claim 15 additionally recites managing workflow in a

printing system (Squires, Abstract) and one or more workflow processing devices (Squire, Fig. 1, elements 5 and 7; Fig. 8, elements 77-79).

Referring to claim 20, Squires discloses a workflow assignment method (Abstract; Summary) comprising:

- receiving a user request at a server (Fig. 1, element 2; Fig. 2, element 2; Fig. 3, element 20; col. 3, lines 58-64), the request having one or more user-desired product properties (print job characteristics, col. 4, line 60 – col. 5, line 10; see also Fig. 7, elements 46, 48 and 50);
- providing in the server a prestored stylesheet having predefined rules for processing the user request ('capacities' and 'capabilities' predefined rules in storage, col. 4, lines col. 4, line 11 – col. 5, line 15; Fig. 5-7);
- loading the predefined rules and the user request into a processing circuitry of the server, the circuitry configured to process the user request ('Processor', Fig. 3, element 22; col. 3, line 58 – col. 4, line 36; Fig. 3 and 4); and
- without communicating with one or more workflow processing devices, executing the predefined rules on the server to create a transformed user request ('job decomposition module' processes print jobs into sub-jobs based on capacity and capability predefined rules, col. 4, lines 11-36; col. 5, lines 29-54; Fig. 8, element 64), the transformed user request comprising additional information not present in the user request to automatically organize workflow among the one or more workflow processing devices in accordance with the one or more user-desired

product properties to produce a user-desired product (col. 5, lines 16-28 and 35-48; Fig. 8).

Referring to claim 30, the limitations of the claim are similar to those of claim 20 above in the form of a system (Squire, Abstract). As such, claim 30 is also rejected for the same reasons as claim 20.

Referring to claim 31, the limitations of the claim are similar to those of claim 20 above in the form of an article of manufacture (Squire, Abstract; col. 2, lines 42-46). As such, claim 30 is also rejected for the same reasons as claim 20. Claim 31 additionally recites processor usable media embodying programming (col. 3, line 58 – col. 4, line 2).

Referring to claim 2, Squires discloses that the transformed user request is received by a controller external to the workflow management device, the controller configured to control the workflow in accordance with the one or more user-desired product properties (product cell controller, col. 3, line 58 - col. 4, line 3; Fig. 3, element 16; col. 4, lines 27-36).

Referring to claim 3, Squires discloses that the transformed request comprises additional information to process the user request in accordance with specifications of the user and the additional information comprises information to route and process the workflow in accordance with the one or more user-desired properties, and information to

prioritize processing of the workflow in accordance with the one or more user-desired product properties (Fig. 7, 9; col. 5, line 55 – col. 6, line 14).

Referring to claims 16 and 21, Squires discloses a controller external to the workflow management device and the one or more workflow processing devices, the controller configured to receive the transformed request, and route the transformed request among the one or more workflow processing devices for-processing in accordance with the one or more user-desired product properties using information from the transformed request (product cell controller, col. 3, line 58 - col. 4, line 3; Fig. 3, element 16; col. 4, lines 27-36; Fig. 7, 9; col. 5, line 55 – col. 6, line 14).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 4, 5, 17, 22, and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Squires, as applied to claims 1, 15, and 20 respectively, and further in view of US Publication 2002/0184240 by Volkoff et al (hereafter Volkoff).

Referring to claims 4, 17, and 22, Squires discloses all of the above claimed subject matter, however remains silent as to a job definition format (JDP) for a user request.

However, Volkoff teaches job definition formats for service or job requests (para. 34).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include a job definition format for requests, as taught by Volkoff.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of adhering to a definition formatting standard (Volkoff, para 34).

Referring to claim 24, the combination of Squires/Volkoff discloses receiving the user request via the Internet (Volkoff, para. 34).

Referring to claim 5, Squires discloses all of the above claimed subject matter, however remains silent as to receiving the user request via the Internet.

However, Volkoff teaches receiving a user request via the Internet (para. 34).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include receiving a user request via the Internet, as taught by Volkoff.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing a broad spectrum of communications between entities (Volkoff, para 35).

8. Claims 6-9, 18, 19, 23, 25, and 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Squires, as applied to claims 1, 15, and 20 respectively, and further in view of US Patent 6,507,857 issued to Yalcinalp.

Referring to claims 6, 18, and 23, Squires discloses all of the above claimed subject matter, however remains silent as to instructions written in Extensible Stylesheet Language.

However, Yalcinalp teaches instructions written in Extensible Stylesheet Language (col. 6, lines 55-57).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include instructions written in Extensible Stylesheet Language, as taught by Yalcinalp.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing the content of documents to be transformed thereby providing greater flexibility and control over the display of a document's content (Yalcinalp, col. 1, lines 20-25).

Referring to claims 7 and 25, Squires discloses all of the above claimed subject matter, however remains silent as to an extensible stylesheet language transformation (XSLT) processor.

However, Yalcinalp teaches an extensible stylesheet language transformation (XSLT) processor (Fig. 1, element 110).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include an extensible stylesheet language transformation (XSLT) processor, as taught by Yalcinalp.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing the content of documents to be transformed thereby providing greater flexibility and control over the display of a document's content (Yalcinalp, col. 1, lines 20-25).

Referring to claims 8 and 19, Squires discloses all of the above claimed subject matter, however remains silent as to an extensible stylesheet language transformation (XSL) to the user request to produce the transformed user request.

However, Yalcinalp teaches an extensible stylesheet language transformation (XSL) to a user request to produce a transformed user request (col. 5, lines 61-64).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include an extensible stylesheet language

transformation transformation (XSL) to a user request to produce a transformed user request, as taught by Yalcinalp.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing the content of documents to be transformed thereby providing greater flexibility and control over the display of a document's content (Yalcinalp, col. 1, lines 20-25).

Referring to claim 26, Squires discloses all of the above claimed subject matter, and also discloses that the transformed user request comprises a definition of workflow tasks to be performed, and settings and properties for the workflow tasks, configured to produce a user-desired product in accordance with the one or more user-desired product properties (Fig. 7, 9; col. 5, line 55 – col. 6, line 14).

However, Squire remains silent as to applying the predefined rules using an extensible stylesheet language transformation transformation (XSL) to the user request.

However, Yalcinalp teaches applying predefined rules using an extensible stylesheet language transformation transformation (XSL) to a user request (col. 5, lines 61-64).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include applying predefined rules using an extensible stylesheet language transformation transformation (XSL) to a user request, as taught by Yalcinalp.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing the content of documents to be transformed thereby providing greater flexibility and control over the display of a document's content (Yalcinalp, col. 1, lines 20-25).

Referring to claim 9, Squires discloses all of the above claimed subject matter and also discloses storing predefined rules data in at least one stylesheet within the storage device (col. 4, lines col. 4, line 11 – col. 5, line 15; Fig. 5-7).

However, Squires remains silent as to instructions written in Extensible Stylesheet Language (XSL) format.

However, Yalcinalp teaches instructions written in Extensible Stylesheet Language (XSL) format (col. 6, lines 55-57).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include instructions written in Extensible Stylesheet Language (XSL) format, as taught by Yalcinalp.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of allowing the content of documents to be transformed thereby providing greater flexibility and control over the display of a document's content (Yalcinalp, col. 1, lines 20-25).

9. Claims 32 and 33 are rejected under 35 U.S.C. 103(a) as being unpatentable over Squires in view of Yalcinalp, as applied to claim 9, and further in view of US Patent 7,134,073 issued to Fiedorowicz et al (hereafter Fiedorowicz).

Referring to claim 32, the combination of Squires/Yalcinalp discloses all of the above claimed subject matter and also discloses a plurality of stylesheets correspond to a difference subset of product properties, the plurality of stylesheets being related to a respective plurality of workflow processing devices (Squires, Fig. 4, element 48; Fig. 7). However, the combination of Squires/Yalcinalp remains silent as to at least two of the plurality of stylesheets comprising instructions related to the same processing device.

However, Fiedorowicz teaches analogous art that includes a plurality of subset style sheets that can be merged into a global composite style sheet for use on a requesting device (Abstract; Fig. 9 and related portions of specification).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combination of Squires/Yalcinalp to include at least two of a plurality of stylesheets comprising instructions related to the same processing device, as taught by Fiedorowicz.

The ordinary skilled artisan would have been motivated to modify the combination of Squires/Yalcinalp per the above for the purpose of enabling the creation of simple stylesheets that describe standard subsets of content which can be combined into a composite style sheet for a desired datastream (Fiedorowicz, col. 3, lines 33-36).

Referring to claim 33, the combination of Squires/Yalcinalp/Fiedorowicz discloses that the transformed user request generated by a first one of the stylesheets has a different workflow than the transformed user request generated by a second one of the stylesheets (Squires, see sub-workflows, Fig. 4).

10. Claims 34-38 are rejected under 35 U.S.C. 103(a) as being unpatentable over Squires, as applied to claims 1, 15, 20, 30 and 31 respectively, and further in view of US Patent 6,728,947 issued to Bengston.

Referring to claims 34-38, Squires discloses all of the above claimed subject matter and also discloses that the transformed request contains additional information (refer to claim 1), however remains silent as to sequentially routing workflow among a plurality of the workflow processing devices [to achieve the user desired product via the one or more workflow processing devices – *Examiner submits that this limitation is intended use and therefore is automatically fulfilled when the limitation 'sequentially routing workflow among a plurality of the workflow processing devices' is met*].

However, Bengston teaches analogous art that includes using a workflow to manage workflow data between devices by passing workflow data sequentially from one processing device to the next in accordance with the process steps specified by the workflow (Abstract; Fig. 1 and 6 and related portions of specification).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Squires to include sequentially routing workflow among a plurality of the workflow processing devices, as taught by Bengston.

The ordinary skilled artisan would have been motivated to modify Squires per the above for the purpose of enabling processing steps of processing devices at disparate locations to be executing independently and allowing complex workflows to be undertaken quickly and inexpensively (Bengston, col. 2, lines 7-11).

Conclusion

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Cheryl M Shechtman who can be reached on (571) 272-4018. The examiner can normally be reached on 9:00 am - 5:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Don Wong can be reached on (571) 272-1834. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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